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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
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09/349,473 07/09/99 KOITABASHI

N 1272.7910-DI

EXAMINER

MMC2/0908

FITZPATRICK CELLA HARPER & SCINTO  
277 PARK AVENUE  
NEW YORK NY 10172

DO, A

ART UNIT

PAPER NUMBER

2853

DATE MAILED:

09/08/00

**Please find below and/or attached an Office communication concerning this application or proceeding.**

**Commissioner of Patents and Trademarks**

# Notice of Allowability

Application No.

09/349,473

Examiner

An H. Do

Applicant(s)

KOITABASHI ET AL.

Art Unit

2853

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance and Issue Fee Due or other appropriate communication will be mailed in due course.

1. ☒ This communication is responsive to 28 June 2000-Amendment B.
2. ☒ The allowed claim(s) is/are 9-13 and 47.
3. ☐ The drawings filed on \_\_\_\_\_ are acceptable.
4. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).
  - a) ☒ All b) ☐ Some\* c) ☐ None of the CERTIFIED copies of the priority documents have been
    1. ☐ received.
    2. ☒ received in Application No. (Series Code / Serial Number). 08/579,241.
    3. ☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

5. ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. & 119(e).

A SHORTENED STATUTORY PERIOD FOR REPLY to comply with the requirements noted below is set to EXPIRE THREE MONTHS FROM THE "DATE MAILED" of this Office Action. Failure to timely comply will result in ABANDONMENT of this application. Extensions of time may be available under the provisions of 37 CFR 1.136(a).

6. ☐ Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient. A SUBSTITUTE OATH OR DECLARATION IS REQUIRED.
7. ☒ Applicant MUST submit NEW FORMAL DRAWINGS
  - (a) ☐ because the originally filed drawings were declared by applicant to be informal.
  - (b) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review( PTO-948) attached
    - 1) ☐ hereto or 2) ☐ to Paper No. \_\_\_\_\_.
  - (c) ☒ including changes required by the proposed drawing correction filed 09 July 1999, which has been approved by the examiner.
  - (d) ☐ including changes required by the attached Examiner's Amendment / Comment.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the reverse side of the drawings. The drawings should be filed as a separate paper with a transmittal letter addressed to the Official Draftsperson.

8. ☐ Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Any reply to this letter should include, in the upper right hand corner, the APPLICATION NUMBER (SERIES CODE / SERIAL NUMBER). If applicant has received a Notice of Allowance and Issue Fee Due, the ISSUE BATCH NUMBER and DATE of the NOTICE OF ALLOWANCE should also be included.

## Attachment(s)

- |  |   |
|--|---|
| 1 <input type="checkbox"/> Notice of References Cited (PTO-892)  | 2 <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)          |
| 3 <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                    | 4 <input type="checkbox"/> Interview Summary (PTO-413), Paper No. _____             |
| 5 <input type="checkbox"/> Information Disclosure Statements (PTO-1449), Paper No. _____               | 6 <input checked="" type="checkbox"/> Examiner's Amendment/Comment                  |
| 7 <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit of Biological Material | 8 <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance |
|  | 9 <input type="checkbox"/> Other  |

### **EXAMINER'S AMENDMENT**

1. The application has been amended as follows:

a) Replace the abstract with the following:

--In an ink-jet apparatus employing an ink-jet head having a plurality of heaters corresponding to one ink ejection opening and performing printing by ejecting an ink from the ink-jet head, timings of bubble forming are mutually shifted at respective heaters of the plurality of heaters upon application of respective pulses to the plurality of heaters and based on information relating to an ink temperature of the ink-jet head. The ejection amount can be controlled by forming bubbles in the ink to eject the ink through the ink ejection opening.--

b) In claim 47, insert --each of-- before "the" in line 3 and change "timing" to --timings--, and change "the" to --an-- after "based on" in line 4.

### ***Reasons for Allowance***

2. The primary reason for the allowance of claims 9, 12 and 13 is the inclusion of the limitations of: driving means being capable of mutually shifting timings of bubble forming at respective heaters of the plurality of heaters upon application of respective pulses to the plurality of heaters, based on a basis of information relating to an ink temperature of the ink-jet head. It is these limitations found in each of the claims, as they are claimed in the combination, that has not been found, taught or suggested by the prior art of record which makes these claims allowable over the prior art.

***Conclusion***

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to An Do whose telephone number is (703) 308-0525. The examiner can normally be reached on Monday - Friday from 7:00am to 4:30pm.

If any attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John E. Barlow Jr., Art Unit 2853, can be reached on (703) 308-3126. The fax phone number for the organization where this application or proceeding is assigned is (703) 305-3431.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.



AD  
September 5, 2000



John E. Barlow Jr.  
Supervisory Patent Examiner  
Technology Center 2853